



Quality of meals eaten out of home among Norwegian adolescents

Results from the Ungkost-3 Pilot study

INTRODUCTION

- Rapid changes in health behaviors during adolescence influence eating habits
- American studies find:
 - Eating out of home is more common than earlier
 - Fast food outlets are especially popular among adolescents
 - Fast food outlets provide about 1/3 of meals eaten out of home
 - Out of home foods are higher in fat and energy compared with foods eaten at home

INTRODUCTION

What is the quality of meals eaten out of home among Norwegian adolescents?

RESEARCH QUESTION?

Is eating main meals out of home more prevalent among Norwegian 13 than 9 year olds?

Do main meals eaten out of home contribute with more energy than meals eaten at home?

Which food groups are contributing with most energy in main meals eaten out of home?

UNGKOST-3 PILOT STUDY

- Subjects: school children
 - Schools: n=14
 - 9 year olds: n=163
 - 13 year olds: n=190 (adolescents)
- Design
 - 4 days food record
 - Web based tool (WebDASH)
 - Includes all weekdays
 - Season: fall/winter (2013)



UNGKOST-3 PILOT STUDY

Mat registrert totalt i studien: 27.51 Kg.



Logg ut

Frokost



Lunsj

Middag

Spill

Hvor spiste barnet maten?



- Main meals: Breakfast, Lunch, Dinner
- Eating location: At home, at school, with a friend, at after school activity, at restaurant/cafe, other

MAIN MEALS IN UNGKOST-3 PILOT STUDY

- Breakfast
 - 9 year olds: n=642 meals (98%)
 - 13 year olds: n=709 meals (93%)
- Lunch
 - 9 year olds: n=632 meals (97%)
 - 13 year olds: n=682 meals (90%)
- Dinner
 - 9 year olds: n=647 meals (99%)
 - 13 year olds: n=748 meals (98 %)

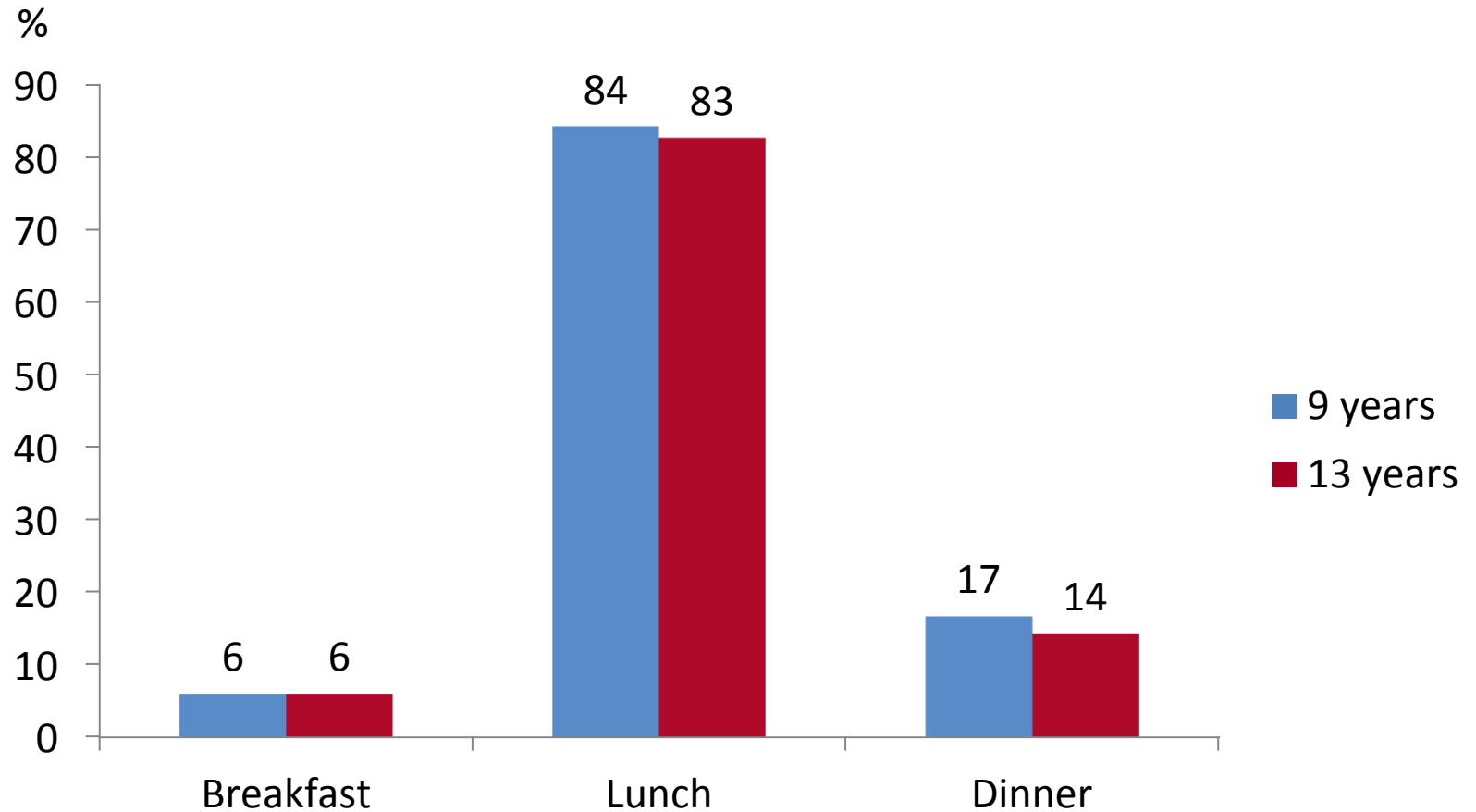
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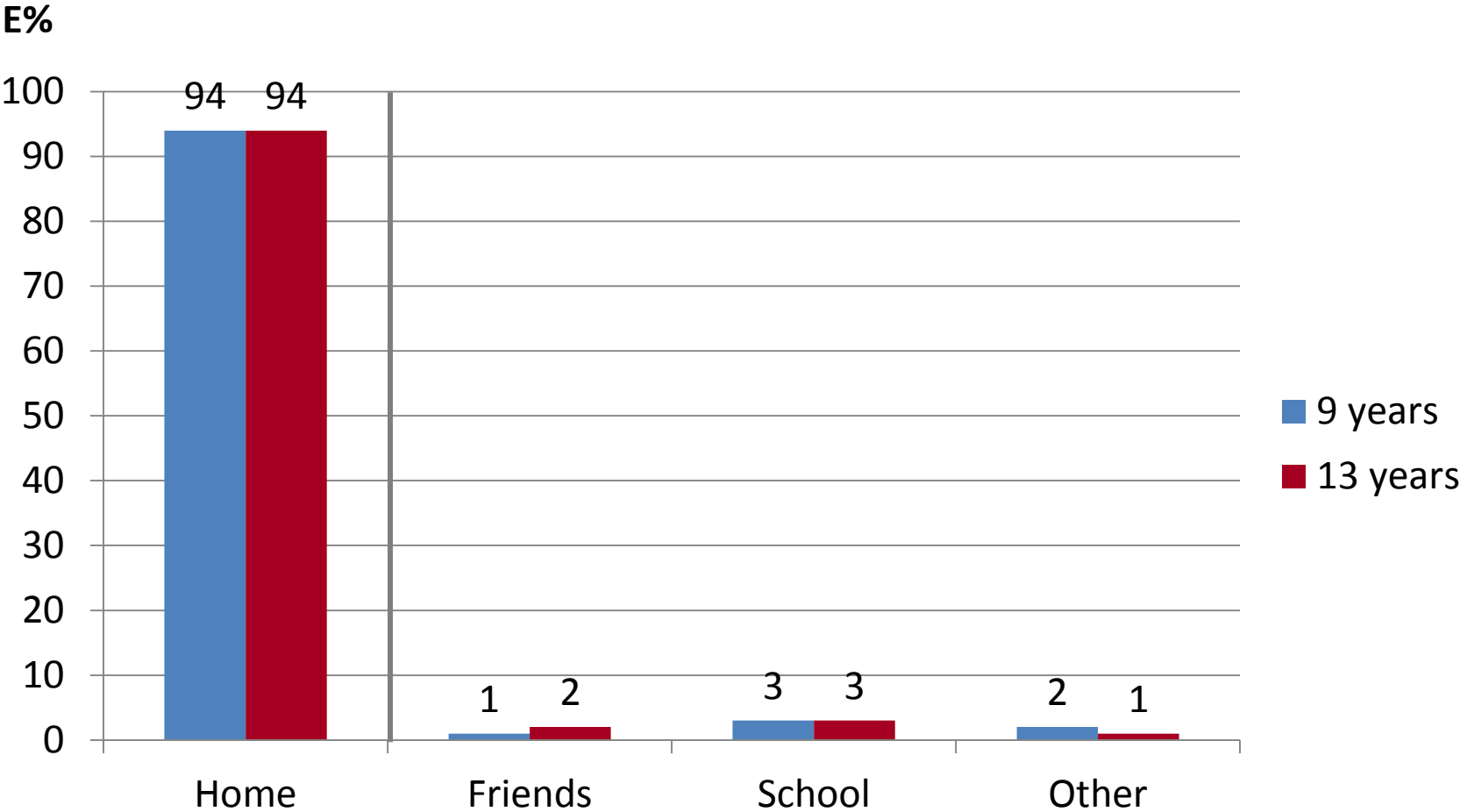
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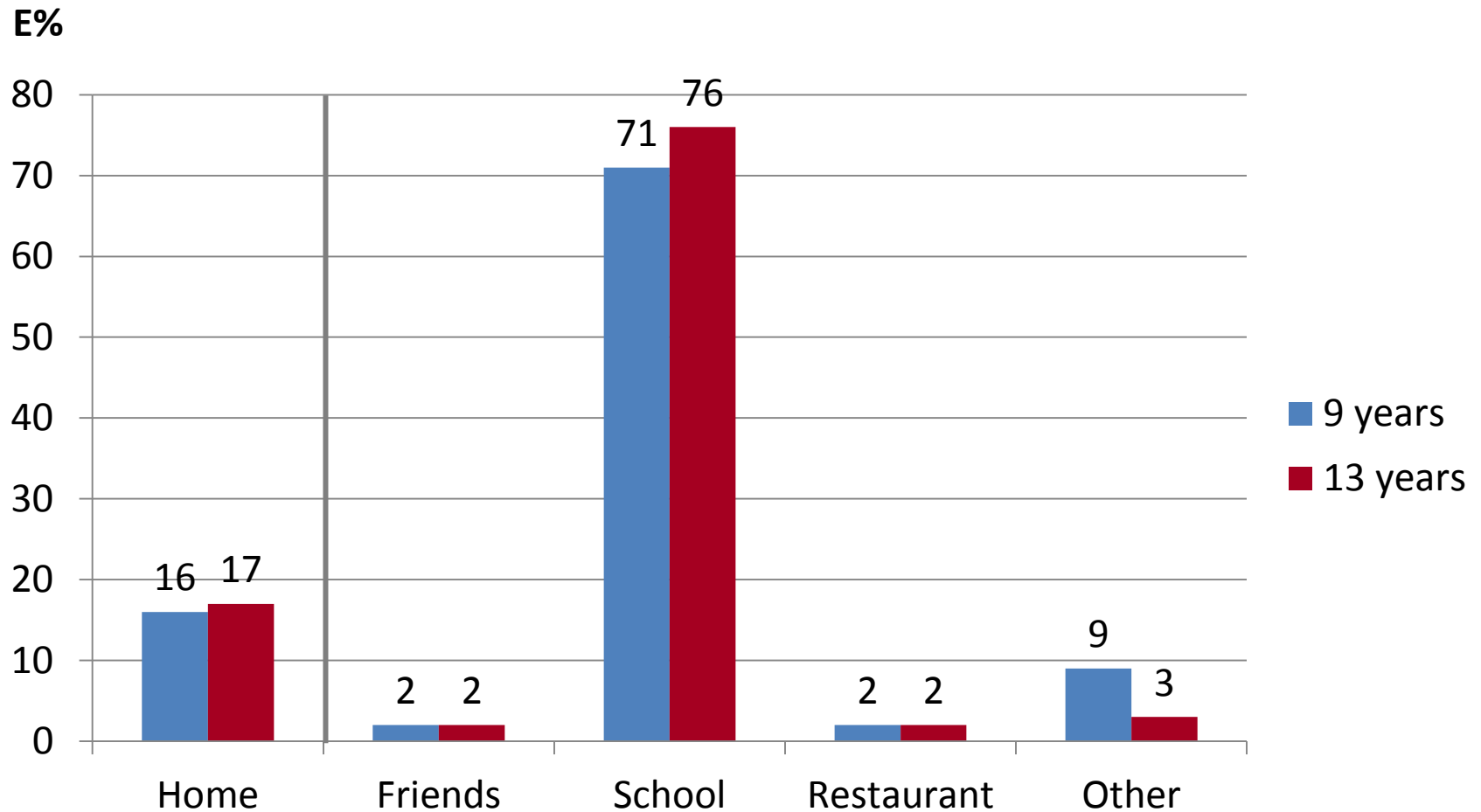
PROPORTION OF MAIN MEALS EATEN OUT OF HOME



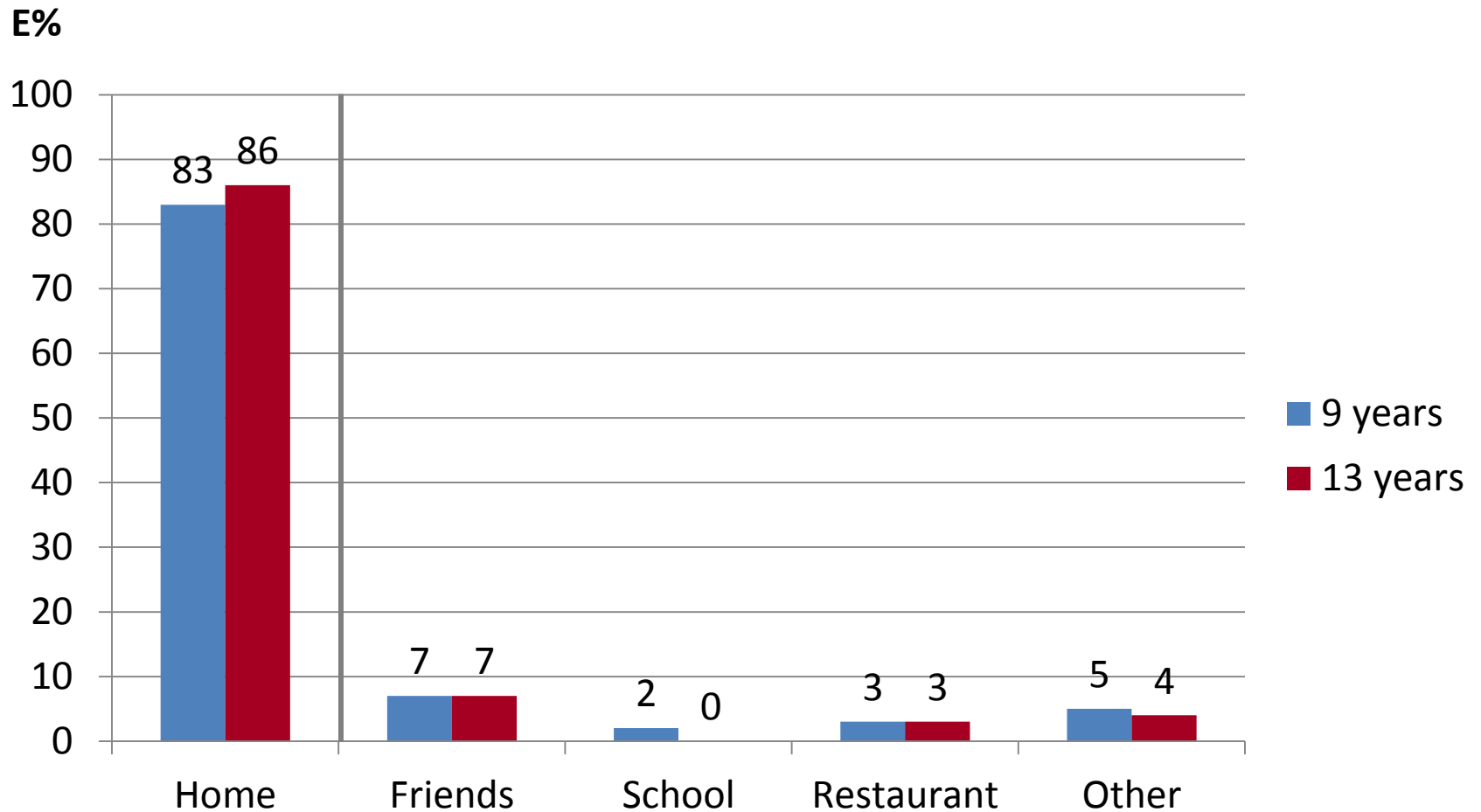
EATING LOCATION OF BREAKFAST



EATING LOCATION OF LUNCH



EATING LOCATION OF DINNER



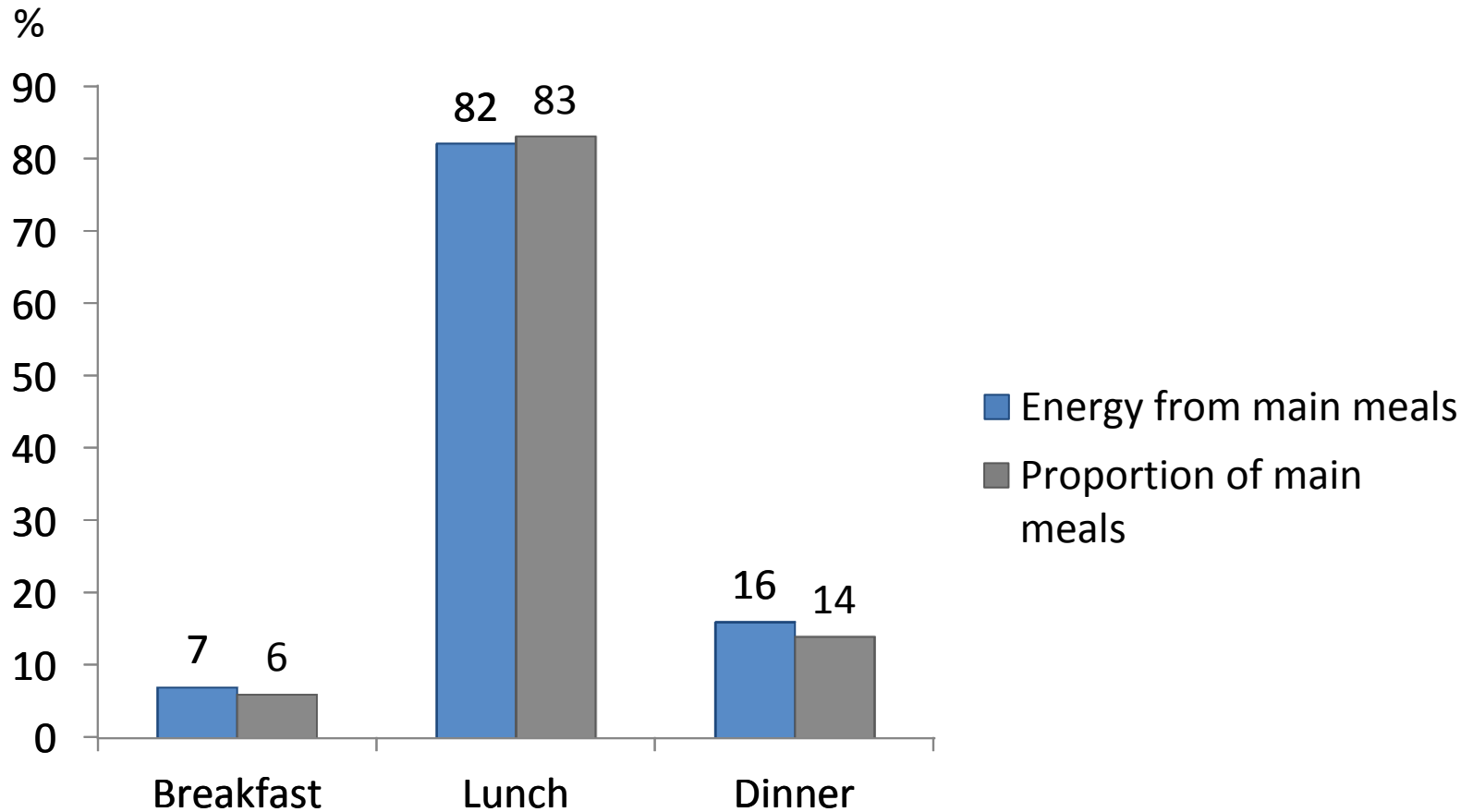
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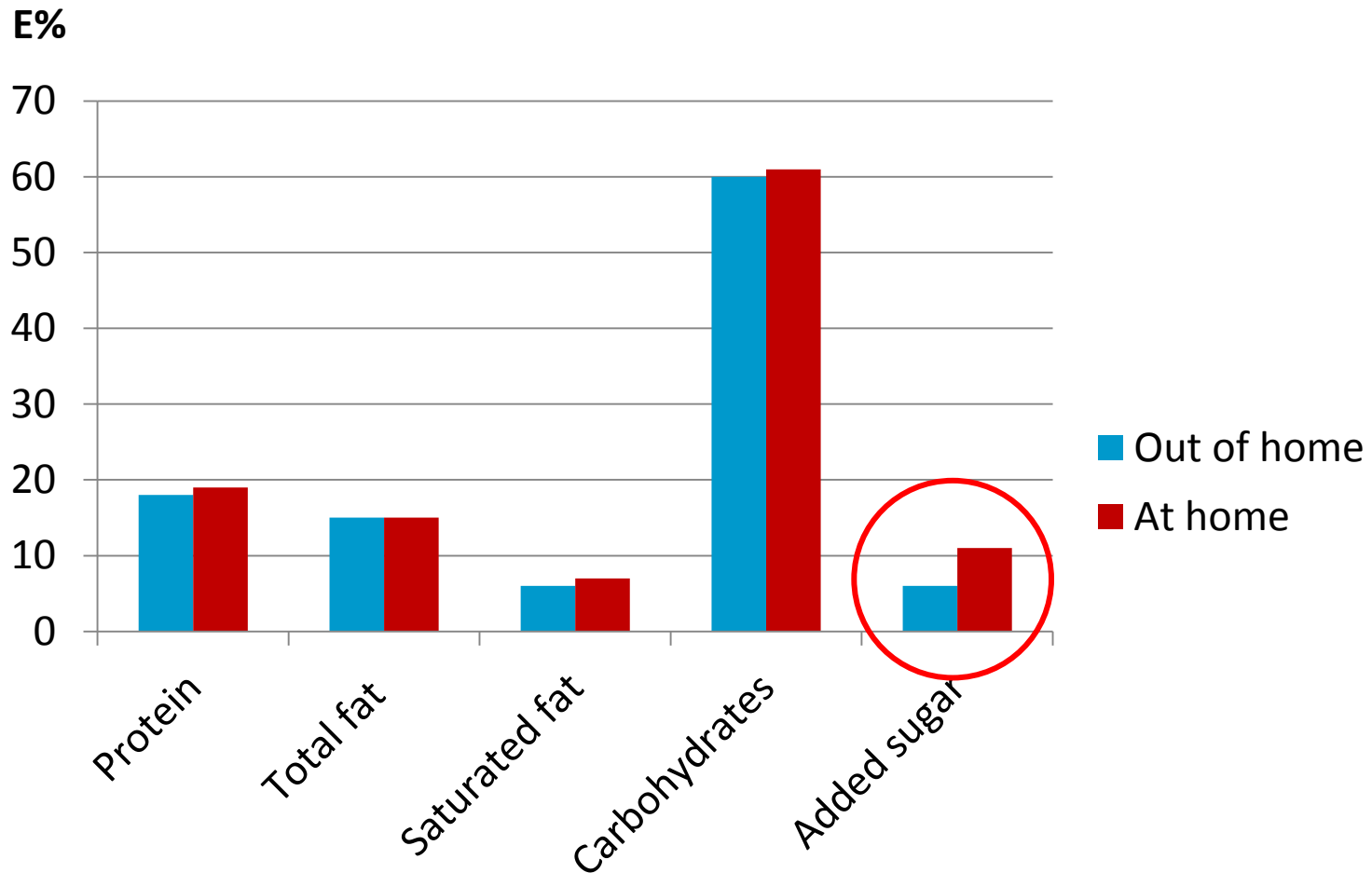
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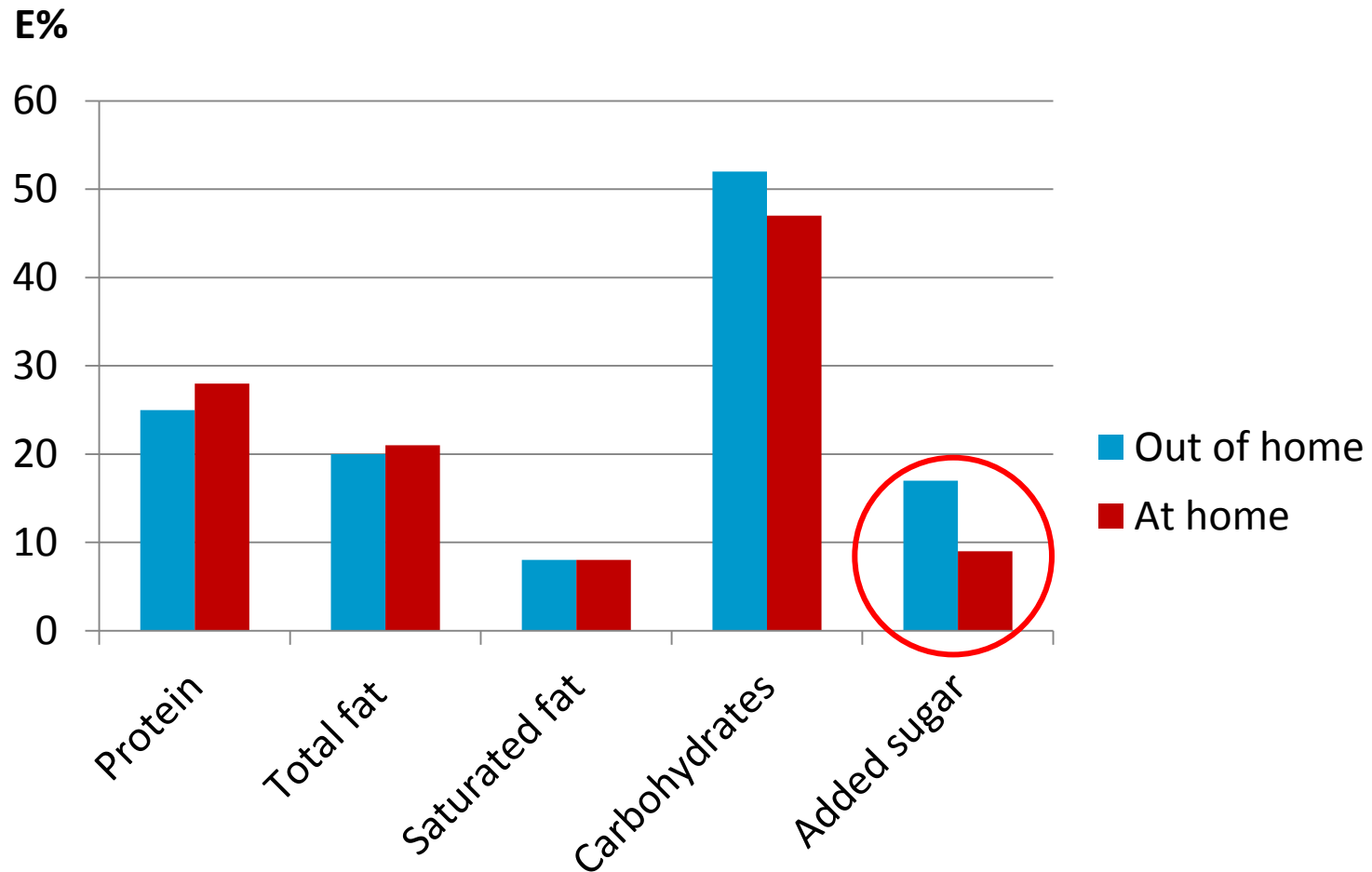
ENERGY FROM MAIN MEALS EATEN OUT OF HOME AMONG 13 YEAR OLDS



ENERGY SOURCES OF LUNCH AMONG 13 YEAR OLDS



ENERGY SOURCES OF DINNER AMONG 13 YEAR OLDS



RESEARCH QUESTIONS?

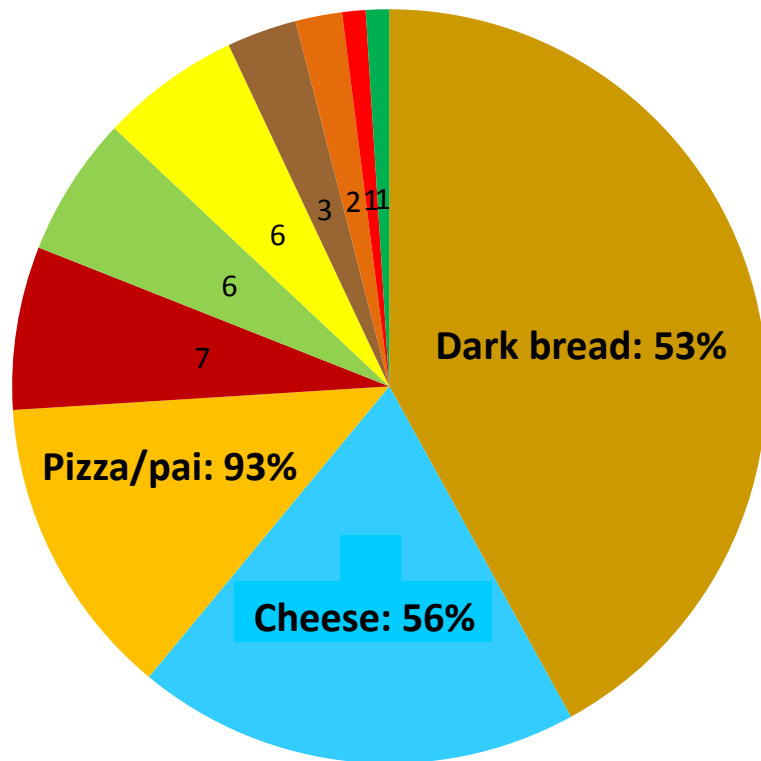
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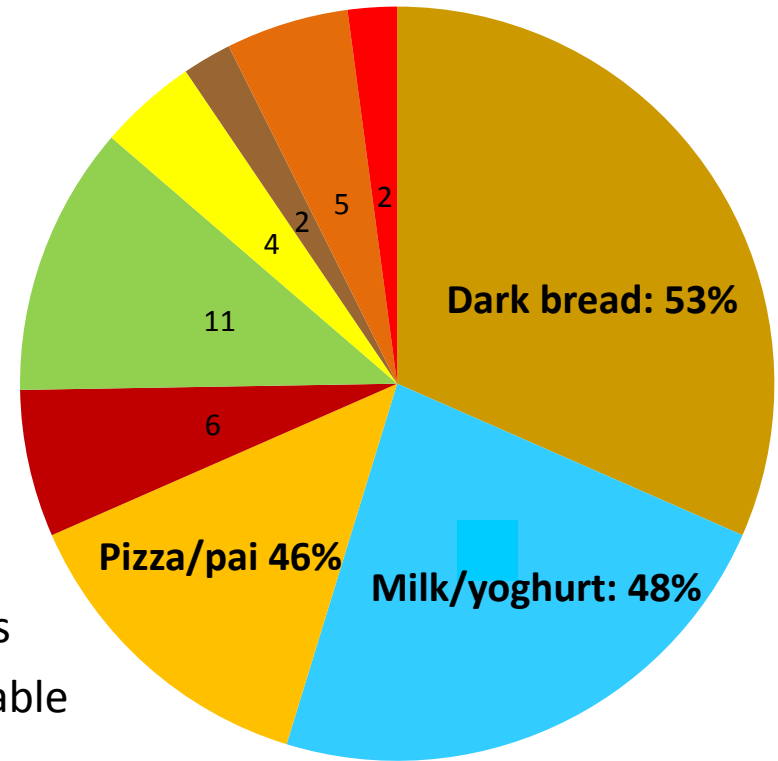
Which foods are contributing with most energy in main meals eaten out of home?

FOODS CONTRIBUTING WITH ENERGY FOR LUNCH AMONG 13 YEAR OLDS

% of total Energy eaten out of home



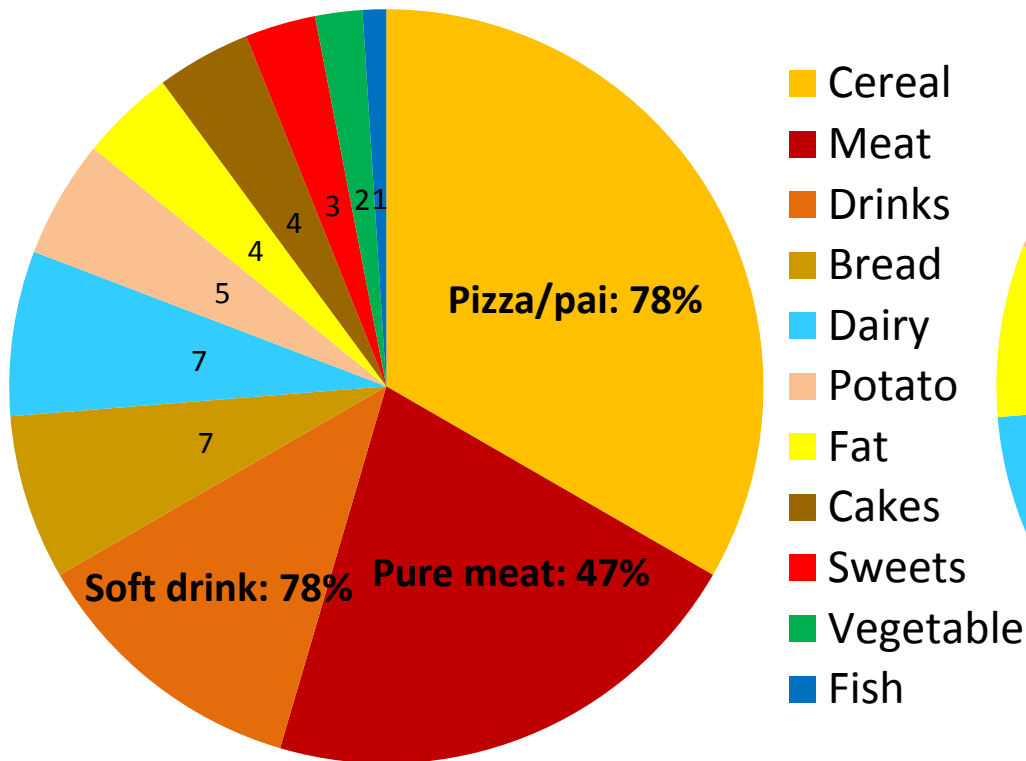
% of total Energy eaten at home



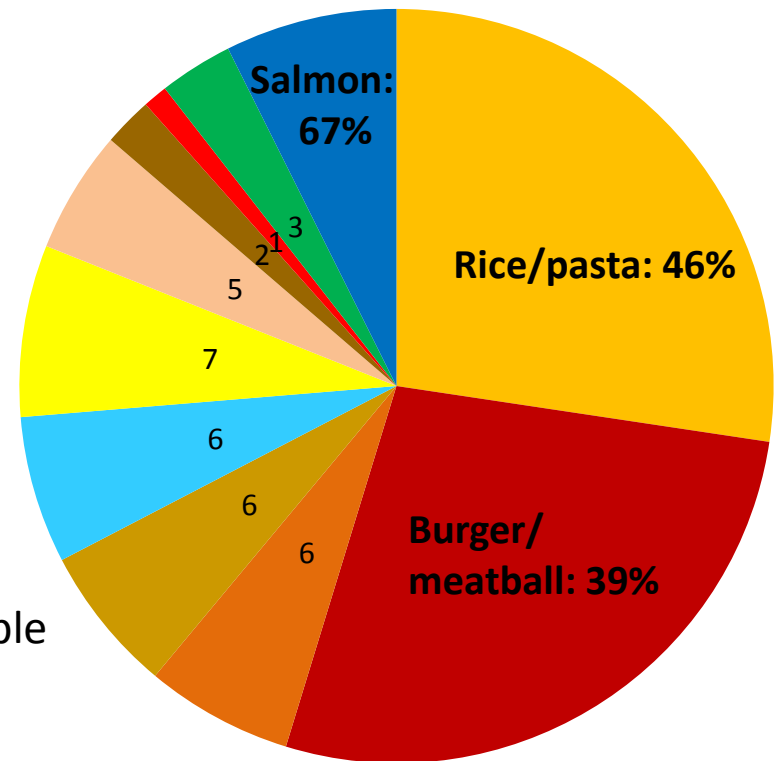
- Bread
- Dairy
- Cereal
- Meat
- Fruit
- Fat
- Cakes
- Drinks
- Sweets
- Vegetable

FOODS CONTRIBUTING WITH ENERGY FOR DINNER AMONG 13 YEAR OLDS

% of total Energy eaten out of home



% of total Energy eaten at home



CONCLUSION

What is the quality of meals eaten out of home among Norwegian adolescents?

CONCLUSION

- Preliminary results from the Norwegian Ungkost-3 pilot study find that:
 - The proportion of eating main meals out of home is similar between 9 and 13 year olds
 - Meals eaten out of home contributes with less energy from added sugar for lunch and more added sugar for dinner
 - More energy from bread, cheese, pizza/pai and soft drinks are found eaten out of home and less from milk/yoghurt, fruit and fish